



CHARM-EU

Education Technologies Catalogue 2026–2027

**Transforming teaching together:
Nine universities, endless possibilities**



A complete collection of all the educational technologies available in CHARM's universities

To inspire, enrich and connect your daily practice

Dear CHARM-EU teaching staff,

This catalogue brings together the digital tools and educational technologies currently used across our nine CHARM-EU partner universities. It represents our collective commitment to pedagogical innovation and the shared expertise of 22,000 faculty members working with 270,000 students across Europe.

Whether you are new to CHARM-EU or looking to expand your digital toolkit, this catalogue is your starting point. It is organized into two sections:

- **Essential tools**, which are the core technologies that every Master's programme lecturer should be familiar with and incorporate into their teaching and learning practices, and
- **Additional teaching and learning tools**, showcasing a range of solutions, use cases, and ideas to support different teaching scenarios. Each tool featured here is actively used in at least one CHARM-EU institution. Interested in a tool not listed for your university? Contact your institution's IT or support services for advice on adoption, licensing, and possible alternatives.

Throughout the catalogue, **FOCUS ON** entries showcase selected tools in greater detail. For more information, contact CHARM-EU educationalists, your TA, fellow CHARM-EU teachers, or, where available, your institution's local team.

Explore. Connect. Innovate.

We hope this catalogue inspires new ideas, helps you discover valuable digital teaching tools, and connects you with colleagues who can support and enrich your teaching practice.

Welcome to our shared ecosystem of educational innovation!

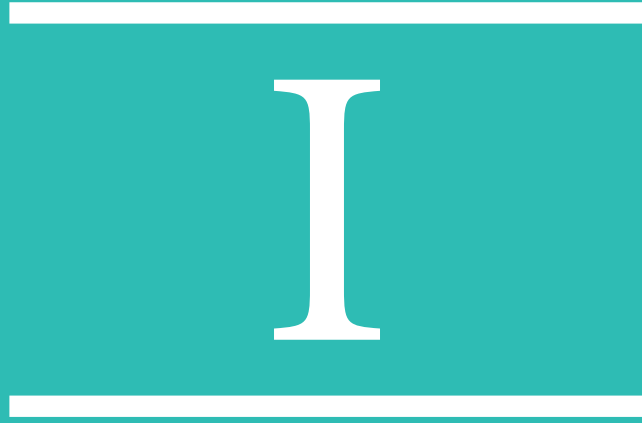


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Essential Tools



I. Essential Tools

All teaching and learning in the CHARM-EU Master's programme is supported by the following four core platforms. Tools are marked as follows to indicate their licence type:

- ★ Open source
- ★★ Free/Freemium
- ★★★ Paid

The Core of CHARM-EU's Digital Learning Environment:

Moodle ★	Learning Management System
	CHARM-EU's collective online space for self-paced learning and self-assessment, sharing information and organising classes
eJournal ★★★	Programmatic Assessment Platform
	CHARM-EU's tool of choice for visualizing learning progress over time and promoting learning success through feedback
BigBlueButton (BBB) ★	Video Conferencing Tool
	CHARM-EU's central platform for coming together live online and collaborating synchronously, whether remotely or in a hybrid setting
element.io ★★★	Team Chat
	CHARM-EU's primary communication platform, enabling secure and efficient collaboration

These four platforms form the foundation of CHARM-EU's digital ecosystem. All stakeholders should use these platforms as the default solution for teaching, learning, communication, collaboration, and information management activities. We encourage you to familiarise yourself with these resources and to take advantage of the professional development opportunities available to teaching staff through both the CHARM-EU alliance and your home institution from the outset.



FOCUS ON: Moodle

The robust digital counterpart to your physical classroom



What is it?

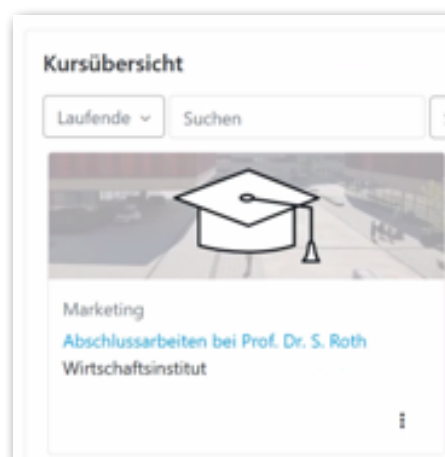
Moodle is one of the most widely used and popular learning management systems worldwide and stands at the centre of CHARM-EU's virtual learning environment. The platform enables teachers to organize their classes with ease, communicate asynchronously with all participants, provide pre-existing learning materials, and create and share new learning content, assign tasks, manage submissions, and offer self-assessment activities. For students, Moodle provides a shared virtual space that serves both as a platform for exchange and as a working environment in which they can collaborate with their teachers and fellow students.

Thanks to ready-made course templates, setting up a new Moodle course does not take long. Learning content can be uploaded from existing personal resources in just a few clicks, or created and integrated directly within the platform itself. Even the creation of multimedia and interactive learning activities, such as online quizzes, is possible with relatively little effort. For advanced users, Moodle offers everything needed to develop complex learning environments that are tailored precisely to the requirements of their classes, including a wide range of plugins and interfaces that connect Moodle with specialised tools for specific teaching and learning scenarios.

Benefits for virtual mobility

In a study environment where teachers and learners are spread across different countries, Moodle can serve as a shared online space that provides orientation and fosters a sense of belonging. The platform brings together all course materials and self-study resources in a single, familiar location, providing a dedicated course hub that is accessible anytime, from anywhere.

With Moodle, assignments, student work, and feedback can be shared and collected clearly and kept easily accessible. As a result, teachers and learners always know exactly what is currently required and what still needs to be done. Student group work can also be prepared, coordinated, carried out, and supported within the same platform using features such as the Moodle scheduler and group mode. This can significantly reduce the organisational workload for both teachers and students over the course of the semester.





For teaching and learning scenarios spanning different locations and time zones, it is particularly relevant that Moodle makes it possible to:

- Create learning materials directly within the same platform in which students will later use them, providing numerous built-in tools and a broad range of specialised plugins, accessible from anywhere, without switching platforms or interrupting the learning flow
- Respond more effectively to different learning needs and preferences by providing learning content in multimodal formats, thereby helping to create more inclusive learning environments
- Support continuous learning through pre-structured course modules and/or respond to individual learning progress through adaptive learning paths (see case study)
- Create opportunities for self-directed and exploratory learning at the same time,
- Maintain learners' motivation during longer asynchronous working phases through gamification elements
- Collaborate successfully across greater distances in a shared virtual space, and
- Access learning resources everywhere using mobile devices

Case Study

Staying in contact and keeping motivation high during asynchronous learning phases

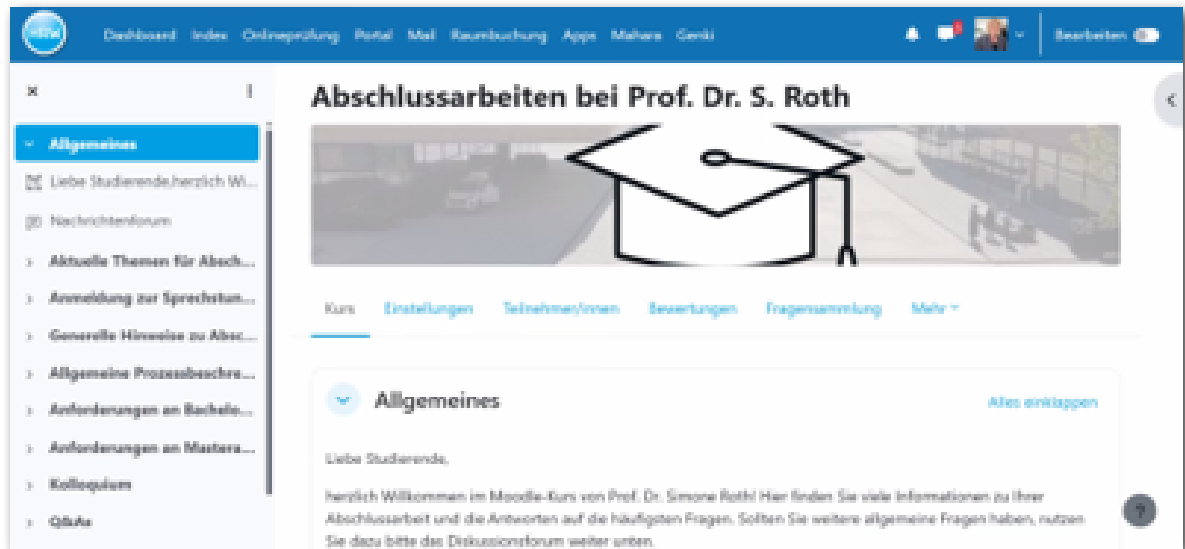
When Prof. Dr. Simone Roth, Professor of Marketing at HRW, first started working with Moodle, she used the platform to share static learning material with her students—much like many instructors taking their first steps into digital teaching. Over time, however, she discovered that Moodle had far more to offer, both for her and for her students, and could make her life as a teacher and researcher much easier.

Moodle helps her to communicate with students, organize exams, and supervise theses and projects. Simone has a dedicated Moodle course for Bachelor and Master thesis projects to stay in touch with the students about their progress, share relevant knowledge pieces and templates (e.g. example exposés, referencing guide on AI tool usage), offer a FAQ-section and facilitate the booking of appointments during their writing phase.

She also uses Moodle courses to accompany all of her classes. For every class, she creates a key visual, which leads students directly to their respective courses. Simone is exclusively teaching in flipped-classroom-style, which means that she expects her students to be well-prepared for her classes and study lecture material provided in Moodle in advance. Moodle is for her the perfect platform to support students' learning and keep students motivated. One way she achieves this is by keeping parts of the Moodle course – which she has already prepared by the start of the semester – hidden from students' view and gradually revealing new learning content according to the progress of the module. Additionally, she fosters



student engagement by using gamification elements, combining Moodle with the LevelUp! Pro plugin that adds levels and high scores to Moodle courses.



I try to use a new Moodle function every semester, like handing in tasks or using the forum. It's not about changing something big but moving forward step by step.

— Simone Roth, professor, HRW

Resources

- **Official website:** <https://moodle.org>
- **Documentation:** <https://docs.moodle.org>



FOCUS ON: eJournal

The perfect tool for programmatic assessment



What is it?

eJournal is a digital portfolio tool specifically designed for educators to support student learning and assessment. It is an extensive and popular tool. At CHARM-EU, its implementation is focused on Programmatic Assessment, giving students and teachers a shared space to document, guide, and evaluate learning over time. It encompasses five key elements:

1. Track progress: Interactive timelines and dashboards give both students and teachers a real-time view of development against the programme's learning outcomes, rather than a single end-of-course snapshot.
2. Monitor student development with interactive timelines and dashboards.
3. Encourage reflection: Use custom templates to guide students in documenting their learning journey, provide peer assessments and work closely together in groups.
4. Simplify feedback: Provide timely, actionable feedback that guides teachers and students through the Programme Learning Outcomes (PLO) attached to each separate assignment.
5. Easy access: Provide teachers with easy access to Needs Assessment reports and Personal Development Plans.

Benefits for virtual mobility

- **Asynchronous interaction with tutors and peers:** Students and teachers do not need to be online at the same time or in the same location to give and receive meaningful feedback, which matters when a cohort spans multiple time zones and academic calendars.
- **Digital documentation:** A single, persistent record of a student's development, feedback history, and Personal Development Portfolio (PDP) that follows them across the programme rather than fragmenting across institutions or courses.
- **Encourages reflective learning:** Structured templates prompt students to actively reflect on their own progress rather than passively receive grades, which is core to how CHARM-EU wants students to engage with Programmatic Assessment.
- **Supports staff coordination across institutions:** Because PLOs and feedback are tracked in one shared system, tutors and coordinators at different partner universities can align on a student's progress without relying on separate local records.



Case Study

A module coordinator's week with eJournal

It is the end of the module, and forty group essays have just been submitted. A few years ago, this would have meant an inbox full of attachments, a spreadsheet to track who submitted what, and manually cross-referencing PLO levels against a paper rubric for each student. Now, a teacher or coordinator opens eJournal and uses its assessment functionality, which walks them through each student's assessment: read the entry, select the rubric level per criterion, add feedback, and submit the grade. What used to be a scattered, error-prone process becomes a guided, repeatable one. Spotted a mistake during or after grading? eJournal enables a teacher to amend the assessment directly, rather than starting over or needing to email a correction separately.

Checking who had submitted on time previously required reviewing submission timestamps individually. Now, this information is immediately visible on the dashboard.

Not every comment needs to be formally recorded as a formal grade. When a student demonstrates significant improvement or actively seeks feedback during the course of an assignment, a coordinator may choose to provide feedback rather than a rubric score. This feedback can remain informal and supportive, while being clearly distinguished from the formal assessment. This approach enables coordinators and teachers to document observations and encouragement without assigning a grade or affecting formal assessment outcomes.

If two students need to move to change groups during a module, eJournal allows this to be done easily while preserving the group's shared work and activity history.



Overview of results within one PLO



5.2 Oral Communication

0x

PLO 5 Communication

Communicates effectively with diverse stakeholders, e.g., clients, colleagues, peers, other relevant stakeholders and the public

Pre-Novice	Pre-Novice	Pre-Novice	Novice	Novice	Novice	Intermediate	Intermediate	Intermediate
PNv -	PNv	PNv +	Nv -	Nv	Nv +	Im -	Im	Im +

7.1 Demonstrates reflexive skills

0x

PLO 7 Professional and personal development

Pre-Novice	Pre-Novice	Pre-Novice	Novice	Novice	Novice	Intermediate	Intermediate	Intermediate
PNv -	PNv	PNv +	Nv -	Nv	Nv +	Im -	Im	Im +

Thanks for sharing your reflection about the grand debate. Also, thanks for your suggestions!

It could be seen that you were always well prepared and critically contributed for the debates. It is interesting how your own experience and the readings combined

Step-by-step flow for Programmatic Assessment

Resources

- Official website: www.ejournal.app



FOCUS ON: BigBlueButton (BBB)

A highly effective tool for running live, interactive, virtual classes



What is it?

BigBlueButton (BBB) is an open-source virtual classroom and web-conferencing tool designed for online teaching and learning. It enables teachers, students, and support staff to meet synchronously in a browser-based room, with audio, video, slides, screen sharing, chat, polling, shared notes, breakout rooms, and whiteboard activities.

At the University of Montpellier, BBB is provided through the national higher-education and research infrastructure (ESR). It is not used as a separate standalone service: teachers and students access it through Moodle course spaces and through the Meetings module of the Esup-Pod video platform. This makes BBB useful for live classes, tutorials, hybrid teaching, remote collaboration, and follow-up sessions connected to existing university learning environments.

Benefits for virtual mobility

For virtual mobility, BBB helps partner institutions organize live learning moments without moving students away from the platforms they already use. It supports synchronous interaction, collaborative activities and continuity between live sessions and course resources.

- **Live interaction across locations:** Teachers can run online classes, tutorials or office hours with audio, video, screen sharing, presentations, chat, and whiteboard support.
- **Active and inclusive learning:** Polls, shared notes, breakout rooms, and collaborative whiteboards help remote students participate rather than only watching a lecture.
- **Lower organizational workload:** At the University of Montpellier, sessions are launched from Moodle or Esup-Pod, so educators can manage access from existing courses or video-platform contexts rather than creating a separate external meeting workflow.



Case Study

Running a synchronous virtual class from Moodle or Esup-Pod at the University of Montpellier

In a virtual mobility or hybrid-teaching context, a teacher can create a BBB class session from a Moodle course space, so enrolled students join from the course they already use. For meetings linked to the video platform, staff and students can also access BBB through the Meetings module in Esup-Pod (see FOCUS ON: Esup-Pod). During the session, the teacher can present slides, share a screen, use the whiteboard, open polls, organize group work and use shared notes or chat to support participation.

Resources

- **Official website:** <https://bigbluebutton.org/>
- **Getting started:** ESR guide, “Create your virtual classroom” - <https://doc.numerique-esr.fr/guide-dutilisation/creer-votre-classe-virtuelle>
- **Tutorials:** ESR BigBlueButton user guide - <https://doc.numerique-esr.fr/>
- **University of Montpellier information:** Videoconferencing / web-conferencing - <https://numerique.umontpellier.fr/offres-numeriques/visioconference-web-conference/>



FOCUS ON: element.io

The ideal platform for secure online communication and collaboration



What is it?

element.io is a secure messaging and collaboration app. Conversations occur within rooms that have either been pre-selected or created by students or teachers. It supports group chat, voice and video calls, threads, file sharing, and widgets that embed external tools directly into a room. Because it is built on an open standard rather than a proprietary one, an institution can self-host element.io and keep full control of data being stored, ensuring the digital sovereignty of our student and staff data. This is exactly why CHARM-EU is piloting it as a replacement for Microsoft Teams: it supports the alliance's move toward digital sovereignty, while integrating more cleanly with Moodle than Teams currently does.

At CHARM-EU, the transition from MS Teams to BBB and element.io is being implemented through a phased pilot. Instead of a single system-wide transition, tracks are introduced incrementally, with continuous support and iterative training provided to Moodle coordinators, teachers, and students.

Benefits for virtual mobility

- **Asynchronous, encrypted communication across institutions:** Students and teachers spread across nine countries have access to a shared, secure platform that is independent of any single partner university's Microsoft tenant. This will simplify the management of chats and file-sharing.
- **Structured by track, not fragmented by tool:** element.io lets each track (Sustainability, Social Innovation, Transdisciplinary Research) have its own organized set of rooms, plus a shared overall Phase space, without staff or students needing separate logins per institution. In addition, students can add and manage their own team collaborative spaces.
- **Digital sovereignty:** Because element is self-hosted, CHARM-EU keeps ownership of conversation data rather than depending on the terms of a specific provider.
- **Fully mobile:** Students can participate in calls and collaborate without using a computer. The platform is also available through mobile and tablet apps using the same login credentials.

Case Study

A student's daily use of element.io

A student on the Sustainability Module track needs to contact a groupmate quickly to sort out who is responsible for each part of an assignment. Rather than relying on email or searching for contact details, students can open their group room and start a voice or video call immediately. There is no



need to switch to another platform, as calling is integrated into element.io. Their team's collaboration room already contains everything from earlier in the phase: shared documents, meeting notes, and files uploaded over past weeks, all searchable and organized within that one room rather than scattered across email threads or a separate drive.

Mid-module, a smaller group forms to work on a specific challenge outside the main team room. Instead of asking a coordinator to set something up, a student creates a new room themselves, adds the relevant people, and starts working. This new room has its own file space and conversation history, separate from the main track room but equally easy to manage.



II

Additional Teaching and Learning Tools



II. Additional Teaching and Learning Tools

In addition to the essential tools and platforms recommended by the CHARM-EU alliance, there are a wide range of other tools in use at the nine CHARM-EU partner universities. You are not expected to learn or use every tool listed below, and successful teaching in CHARM-EU does not depend on mastering them all. Instead, the list is available to give you ideas and options, should you want to expand your toolkit, find a solution for a particular training need, or explore new platforms at your home institution.

Tools are marked as follows to indicate their licence type:

- ★ Open source
- ★★ Free/Freemium
- ★★★ Paid

Abbreviations

ÅAU - Åbo Akademi University

UB - University of Barcelona

UiB - University of Bergen

ELTE - Eötvös-Loránd University Budapest

TCD - Trinity College Dublin

UM - University of Montpellier

HRW - Ruhr West University of Applied Sciences Mülheim/Bottrop

UU - Utrecht University

JMU - University of Würzburg



1. Learning Management

Need a digital home base for your course?

Our partner universities rely on the following learning management systems (LMS's) to manage materials, assessments, and student progress:

Moodle ★

Used by: CHARM-EU, ÅAU, ELTE, HRW, JMU, UM, UB



A free, open-source Learning Management System (LMS) designed to help educators, administrators, and learners get together in customised online learning environments

Canvas ★★★

Used by: UiB, ELTE



A Learning Management System (LMS) used by learning institutions, educators, and students to access and manage online course learning materials and communicate about skill development and learning achievement

Brightspace ★★★

Used by: UU



A cloud-based Learning Management System (LMS) developed by Desire2Learn (D2L)

Blackboard Ultra ★★★

Used by: TCD



A cloud-based Learning Management System (LMS)



2. Communication

Want to improve the virtual mobility of your class? Explore this collection of tools for hybrid teaching and (a)synchronous online communication!

BigBlueButton ★

Used by: CHARM-EU, UM, ELTE



An open-source virtual classroom and web conferencing system built specifically for online learning

element.io ★★★

Used by: CHARM-EU, ELTE



A Matrix-based end-to-end encrypted messenger and secure collaboration app

Cisco Webex ★★★

Used by: HRW



A cloud-based unified communications service including video conferencing and messaging that enables remote and hybrid teams to collaborate from anywhere

Class Collaborate ★★★

Used by: TCD



A web video conferencing and webinar platform for online teaching and learning integrated into Blackboard LMS

Zoom ★★★

Used by: ÅAU, JMU, UiB, UB



A video conferencing platform used for virtual meetings, webinars, and team collaboration

Microsoft Teams (Premium) ★★★

Used by: ÅAU, HRW, TCD, UiB, UM, UU, ELTE, UB

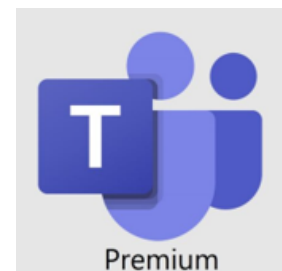


A multi-feature communication and collaboration platform primarily used for meetings, file, and app sharing



FOCUS ON: MS Teams Premium

A powerful tool for multilingual communication, supporting inclusive hybrid and virtual learning



What is it?

Teams Premium offers real-time captions and automatic translation during online meetings, webinars, and hybrid classrooms. Spoken language is converted into written captions, which participants can view in their preferred language during the live session. Teams Premium also offers intelligent meeting recaps and AI-generated notes, making live sessions easier to revisit and reuse.

Teams Premium provides both pedagogical and practical benefits for educators, including:

- Lowering language barriers during live teaching and discussion
- Supporting comprehension for students and staff working in a second or third language
- Reducing cognitive load, allowing participants to FOCUS ON content rather than translation
- Enhancing accessibility, particularly for participants who benefit from written support

By combining live translations, AI supported summaries, and transcripts, Teams Premium helps transform live lectures into accessible, reusable learning assets rather than one off events.

Teams Premium strengthens hybrid teaching by ensuring that students, regardless of location or language background, can engage with content during and after live sessions.

Benefits of using Teams Premium translations in the CHARM-EU hybrid classroom for teachers include:

- **Lower language barriers during live teaching:** Real time captions and translations help ensure that all students can follow lectures, instructions, and discussions, regardless of their first language.
- **Support for inclusive participation:** Teachers can engage multilingual cohorts more effectively, encouraging questions and interaction from students who might otherwise hesitate to speak.
- **Reduced cognitive load for international classrooms:** Automatic translation allows students to FOCUS ON learning content rather than on translating mentally while listening.
- **Enhanced accessibility:** Live captions support students with hearing impairments or those who benefit from written reinforcement of spoken content.
- **Streamlined hybrid teaching:** The feature is built directly into Microsoft



Teams, requiring no additional tools or complex setup.

- **Reduced post teaching workload and enable reusable learning materials:** AI generated recaps, notes, and transcripts reduce the need for manual summaries or follow up documentation. Transcribed and translated sessions can be revisited by students for revision, reflection, or asynchronous learning.

Benefits of using Teams Premium translations in the CHARM-EU hybrid classroom for students include being able to:

- **Understand and engage with teaching more confidently when it is delivered in a language other than their first language:** Live captions and translations support real time understanding.
- **Learn at their own pace:** Transcripts, recaps, and recordings make it easier to revisit complex content after class.
- **Participate more actively:** Reduced language barriers encourage questions, discussion, and collaboration.
- **Benefit from multimodal learning:** Combining spoken input, written captions, and summaries supports deeper understanding.
- **Stay connected across locations:** Hybrid and remote students receive the same access to content and explanations.
- **Support international group work:** Shared transcripts and summaries help align understanding in multilingual teams.

Benefits for Virtual Mobility

In virtual and hybrid mobility contexts, where students and teachers connect across countries, institutions, and time zones, live translations contribute directly to inclusion and shared presence.

- Joint online lectures can be followed more easily by **multilingual cohorts**.
- International group work benefits from **clearer real time understanding**.
- Students can participate more confidently in discussions, even when teaching is delivered in a language other than their first language.
- Hybrid sessions become more equitable for **remote participants**, who receive the same linguistic support as those on site.
- By making spoken interaction more accessible, live translations strengthen co presence and participation across the alliance.

Case Study

Live captions in meetings at Åbo Akademi University

At Åbo Akademi University Teams Premium with live captions has been used to increase linguistic accessibility and participation in internal meetings. In particular, the license has supported the work of the Equality Committee, where members have different working languages and English is the shared language for some participants.



By using live captions, meeting participants can speak Swedish while colleagues with another first language can follow the discussion through real time transcription in English. This has removed the need to run meetings bilingually and has made meetings more inclusive and efficient. Our experience shows that clear articulation and a slightly slower speaking pace improve the quality of the live transcription.

Only the meeting organizer needs the Teams Premium license to use live, translated captions. (If meeting participants need to use other features, such as AI-recaps or AI-created notes, they also need a license).

Resources

- **Official website:** [Teams Premium](#)
- **Instructions for enabling live transcription and translation:** [Enabling live transcription](#)



3. Assessment

Designing how your students will demonstrate their learning? Browse our collection of tools for online exams, reflective ePortfolios, peer evaluation, and plagiarism checks.

3.1 Programmatic Assessment

CHARM-EU uses ejournal in programmatic assessment at programme level.

eJournal ★★ ★

Used by: CHARM-EU



A platform for development and assessment portfolios

3.2 Self-Assessment

Want to give students the opportunity to independently gain an overview of their personal learning progress at any time? The following tools help students put their own knowledge and skills to the test and make gaps visible.

Wooflash ★★ ★

Used by: UM



A collaborative learning platform designed to help students study efficiently through flashcards and interactive quizzes

Quizlet ★ ★

Used by: UM



A digital learning platform and study app that allows users to create and share custom flashcards, practice tests, and educational games

Moodle test ★

Used by: HRW, UM



Assessment functionality within the Moodle LMS for formal exams as well as self-assessments

**STACK (Moodle Plugin) ★****Used by: ÅAU, HRW, UM**

A computer aided assessment package for mathematics, which provides a question type for the Moodle quiz

H5P (Quiz options) ★★**Used by: ÅAU; HRW, UM, UU, UB**

A platform for creating rich, responsive interactive content such as quizzes, videos, and games

Coderunner (Moodle Plugin) ★**Used by: HRW, UM**

A Moodle question type that allows teachers to create programming questions in specific languages (c, java, php and more)

3.3 ePortfolios and Reflective Journals

Want to help students make their learning visible over time? The following electronic portfolio (ePortfolio) platforms support reflection and provide longitudinal evidence of learning:

Mahara ★★★**Used by: HRW, JMU, UM**

An opensource ePortfolio platform that allows learners to digitally document, reflect on, and share their lifelong learning, skills, and career development over time through personal collections of learning artefacts, journals, and blogs



3.4 Feedback and Peer Learning Tools

Want to help students make their learning visible over time? The following electronic portfolio (ePortfolio) platforms support reflection and provide longitudinal evidence of learning:

ChallengeMe ★★★	Used by: UM
	A digital platform designed to support peer assessment activities in higher education. Integrated into Moodle, it allows teachers to organize activities where students submit work, review peers' productions, and provide structured feedback
Feedback Fruits ★★★	Used by: UiB, UU
	An educational technology suite that provides the ability to build engaging assessment and learning activities in Moodle
Pitch2Peer	Used by: UU
	A review tool that allows students to learn from each other's work and feedback

3.5 Plagiarism Detection

Want to safeguard academic integrity? Detection tools help detect originality issues in student submissions.

Compilatio ★★★	Used by: UM
	A plagiarism and AI content detection software for teachers, students, and writers
Turnitin ★★★	Used by: ELTE, TCD, UB, UU
	An academic integrity tool that generates originality reports to help identify potential plagiarism in submitted work



FOCUS ON: ChallengeMe

An ideal tool for peer-assessment and collaborative feedback in higher education



What is it?

ChallengeMe is a digital platform designed to support peer assessment activities in higher education. Integrated into Moodle, it allows teachers to organize activities where students submit work, review peers' productions, and provide structured feedback.

The platform can be used in different pedagogical contexts, particularly within collaborative learning and competency-based approaches. It provides teachers with tools to define evaluation criteria, organize review processes, and follow student participation throughout the activity.

Benefits for Virtual mobility

Peer assessment activities can support interaction and collaboration between students from different institutions and educational contexts. In virtual mobility settings, asynchronous feedback activities may help maintain learner engagement and encourage exchanges between participants by:

- **Supporting collaborative learning practices:** Students engage in reviewing peers' work and reflecting on evaluation criteria.
- **Encouraging interaction between students from different contexts:** Activities can facilitate exchanges of perspectives and approaches in international learning environments.
- **Helping structure peer feedback activities:** The platform supports the organization of submissions, reviews, and feedback collection within a single environment.

Case Study

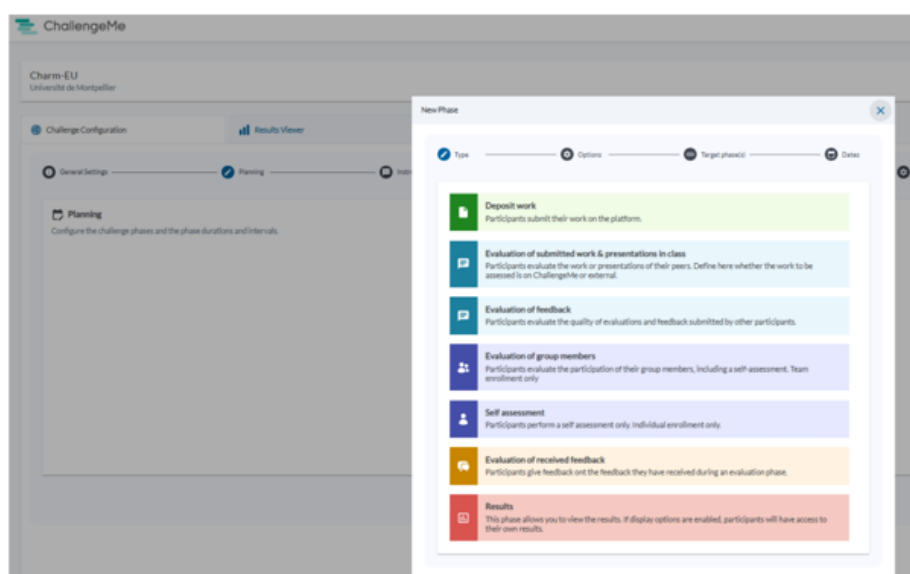
Peer assessment activities within the PAIRSIA project.

At the University of Montpellier, ChallengeMe has been integrated into Moodle within the framework of the PAIRSIA project (Peer Assessment Assisted by Artificial Intelligence). The platform has been used in several courses to support peer feedback activities and reflective learning practices.

Students submit assignments online, evaluate peers using predefined criteria, and receive feedback from fellow students. The project also explores the potential contribution of AI-assisted support for feedback formulation in educational contexts.



Instructors can structure learning activities into successive phases, allowing students to submit work, provide and analyse peer feedback, revise their work, and engage in a continuous feedback process.



Instructors can combine different types of phases to design tailored learning scenarios, including peer assessment, self-assessment, feedback evaluation, group-member evaluation and results review.

Resources

- **Official website:** <https://challengeme.online/>
- **Getting started:** <https://challengeme.online/guide-evaluation-par-les-pairs/>
- **Tutorials:**
 - a. <https://challengeme.online/acces-kit-de-ressources-challengeme/>
 - b. <https://challengeme.online/bibliotheque-cas-usage/>



FOCUS ON: FeedbackFruits

A helpful tool for encouraging peer feedback among students



What is it?

FeedbackFruits is a tool suite filled with options to support peer feedback, teacher-student feedback, and AI options to support the quality of the feedback given. It is easy to use and integrate within the LMS, to provide teachers with an easy-to-use functionality.

In use for over ten years, FeedbackFruits at Utrecht University has become one of the most used educational tools within the university. FeedbackFruits offers a wide range of features that enable universities to implement peer feedback in diverse and innovative ways. FeedbackFruits continues to expand its offering with interactive documents and presentations, providing educators with additional ways to create engaging and innovative learning activities.

Benefits for Virtual Mobility

- Supports **peer feedback** in a digital environment, allowing students to provide feedback regardless of their location
- Supports learning through **interactive presentations and documents**
- Provides **AI generated feedback** allowing students to receive immediate guidance without waiting for responses from peers in different locations

Case study

Facilitating the peer feedback process in a Social Science class at Utrecht University

Providing feedback is an important part of any course. In a multidisciplinary class at UU, in which students from different fields of psychology had to solve a social issue, they had to work on a group assignment and an individual assignment in between. Their submissions had to meet a range of criteria. Students gave each other feedback on their work, explaining what needed to be improved and what was done well. They could then use this feedback to refine their assignment before it was graded by the teacher.

To facilitate the process of peer feedback, the teacher used the FeedbackFruits Peer Review tool. Students gave peer feedback twice on a writing assignment using rubrics through this online tool. The peer feedback process took place outside of the work groups. “Previously, we did it the old-fashioned way: just pairing people up during the study group, saying what the feedback was going to look like, and posting a form on Blackboard for them to use. There was always quite a lot of red tape, with pairing up, then submitting links, checking that it was all good. You had to follow it up a lot,” says the instructor. By using the tool, she hoped for less administrative



work and added value in making this process more organized.

Even though this goal was not fully achieved in the end, as late student submissions still required some manual work (e.g. sending reminders), the teacher recommends this tool to other instructors who want to integrate peer evaluation into their classes, especially if they want to use FeedbackFruits for several years in a row: “(...) it is a bit of a time investment in the beginning, in reading up and asking questions. The tool is easy though, very user friendly, everything spoke for itself.”

For a more detailed tool review go to: <https://www.uu.nl/en/education/centre-for-academic-teaching-and-learning/facilitating-the-peerfeedback-process>

Resources

- Official website: [FeedbackFruits: Scale high-quality learning design effortlessly.](#)
- Getting started: [FeedbackFruits: Scale high-quality learning design effortlessly.](#)
- Tutorial: [FeedbackFruits - YouTube \(5mn video\)](#)



FOCUS ON: H5P (Quiz Functionality)

An innovative tool for creating rich, interactive content and engaging self-assessments



What is it?

H5P is an interactive content creation tool that enables teachers to build engaging learning activities without programming skills. It offers a wide range of content types including quizzes, interactive videos, flashcards, drag-and-drop exercises, branching scenarios, image hotspots, questionnaires, and many more. Some general benefits of H5P are:

- **Engagement:** Engages learners from the very beginning thanks to interactive activities that encourage active participation rather than passive content consumption.
- **Ideal for self-assessment tests:** Create diagnostic quizzes and self-assessments that help learners determine their starting level before beginning a course.
- **Wide variety of question formats:** Multiple choice questions, drag-and-drop activities, image-based questions, fill-in-the-blanks, matching exercises, and branching scenarios support different assessment strategies.
- **Immediate feedback:** Students receive instant responses, explanations, and guidance, helping them identify strengths and areas for improvement.
- **Full LMS integration:** H5P is now embedded into the core functionalities of Moodle.
- **Reusable and shareable content:** Activities can be exported, adapted, and reused across courses and institutions.

Benefits for Virtual Mobility

- **Supports self-paced preparation:** Students can complete placement tests and preparatory activities before participating in virtual exchanges or international courses.
- **Responsiveness:** Integrated into your LMS/Website, it becomes accessible from any location and device. Responsive design allows activities to be completed on computers, tablets, or smartphones.
- **Encourages active engagement between sessions:** Interactive learning activities help students remain involved throughout an online or blended learning experience.
- **Provides adaptive learning pathways:** Branching scenarios can direct learners toward different resources or activities based on their responses and demonstrated level.
- **Supports diverse learning styles:** Multimedia, images, videos, audio, and interactive exercises create a richer learning experience than traditional quizzes alone.



Case study

H5P for self-training and self-assessment

H5P is used for a wide range of purposes at the University of Montpellier. For example, teachers use H5P's Interactive Book function to create self-paced lessons that include quizzes throughout. This allows students to test their knowledge as they progress through the different chapters and helps prevent them from simply skimming the texts—or even clicking through the chapters without engaging with the content at all.

Zotero training is one example of how H5P is used at Montpellier. This H5P resource is shared across several Moodle courses.

MTU documentation - ...

Mode d'emploi

2 / 13

Mode d'emploi

Tutorial

+ Zotero Premiers pas

+ Une présentation vidéo

+ Comment s'y prendre ?

+ Testez-vous !

Service Commun de la Documentation, UPVD, 2022. [licence CC-BY-NC-ND 4.0](#)

Mode d'emploi

2 / 13



The screenshot shows a quiz interface with a sidebar menu on the left and a main content area on the right. The sidebar menu includes items like 'Présentation', 'Mode d'emploi', 'Premiers pas', 'Enregistrer de n...', 'Organiser vos ré...', 'Générer une bibl...', 'Sauvegarder vo...', 'Quelques conseils', 'Testez-vous !', 'Testez-vous', 'Avant de finir ...', 'Bibliographie', 'Crédits', and 'Résumé et transmission'. The main content area displays 'Question 1' with the text 'Pourquoi est-il important de télécharger Zotero Connector, en plus de l'application Zotero ?'. There are two radio button options: 'Pour intégrer Zotero à la barre de votre navigateur Internet.' and 'Pour pouvoir réaliser des bibliographies collaboratives.'. Below the options are 'Vérifier' and 'Suivant' buttons. At the bottom, there is a progress indicator and a footer with the text 'Service Commun de la Documentation, UPVD, 2022. [licence CC-BY-NC-ND 4.0](#)'.

Another example:

The screenshot shows a quiz interface with a sidebar menu on the left and a main content area on the right. The sidebar menu includes items like 'Pourquoi le feedba...', 'Objectifs du module', 'Consignes pour le ...', 'Comprendre le fee...', 'Définition', 'Se tester', 'Test rapide', 'Selon vous, un feedb...', 'Vos attentes et rep...', and 'Votre réflexion'. The main content area displays 'Test rapide' with the text 'Selon vous, un feedback est avant tout...'. There are three radio button options: 'une sanction', 'une aide pour progresser', and 'un avis subjectif'. At the top right, there is a link 'Voir les tentatives (866)'. The interface also shows a progress indicator and a footer with the text '6 / 19 Se tester'.

Resources

- **Official website:** <https://h5p.org>
- **Getting started:** <https://h5p.org/getting-started>
- **Standalone editor for H5P content:** <https://lumi.education/en/lumi-h5p-offline-desktop-editor/>



FOCUS ON: Mahara

An ideal tool for documenting, reflecting on, and showcasing individual and collaborative portfolio work



What is it?

Mahara is an open-source eportfolio platform used in education. Users have a personal online space where they can collect their work (assignments, projects, and media). Mahara lets users create a personal online space where they can reflect on their learning progress, present skills, and achievements (like a digital CV), and share selected content with teachers, peers, or employers.

- **Supports deeper learning:** Mahara encourages users to reflect on what they learn, not just upload work. This helps students understand their progress and build critical thinking skills.
- **Open-source and flexible:** No licensing costs, worldwide community
- **Assessment and standard tools**
- **Integrates with learning systems**

Benefits for Virtual Mobility

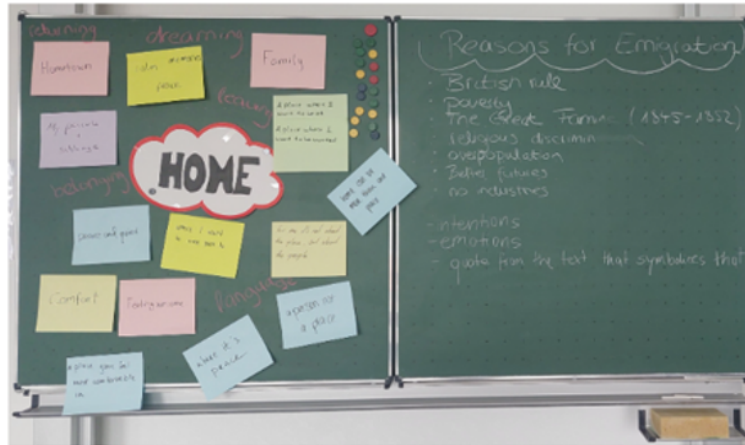
- Students can share their portfolio with teachers and peers who can give feedback.
- Easy sharing across different institutions is possible
- Mahara supports intercultural collaboration (joint projects, feedback)
- Reflection on intercultural learning is encouraged

Case Study

Collaboratively creating thematic collections as eportfolios

Dr. Jennifer Meier is teaching English Didactics at JMU and is using Mahara extensively. A function she really likes is the portfolio for groups. Her students can collaborate on eportfolios and work on thematic collections. “It’s a great interactive tool, which can be used for many goals, like reflection, structure. When using it, make sure to onboard the students properly, so that they can use it effectively right from the beginning.”

In the following image you get a small insight into her course “Teaching Ireland”, where the topic of emigration was explored.



The Emigrant Irish - Fionnula Flanagan



worksheet

Name: _____

Date: _____

Irish and Emigration

"The Emigrant Irish" (1906)
Fionnula Flanagan

Like all lamps, we put them out the back —
of our houses, of our minds. We had light
better than, never than and then

1 a time came, the time and now
we need them. Their dream, make it's emblematic
they would have thought on our necessities.
What they would do could not even live.
By their light now it's time to
imagine how they stood there, what they stood with,
that their associations men become our secret

Task

The current worksheet contains only the poem and a header. Please enrich it by designing meaningful tasks that encourage students to engage deeply with the text. You are free to structure and format the worksheet as you see fit.

Choose either of the following activities:

- **While-Reading Activities:** comprehension and textual analysis to help students understand the poem's themes, language, and structure.

OR

- **Post-Reading Activity:** creative task that encourages students to understand and explore the concepts of identity and belonging. This activity should prompt students to reflect on and connect the poem's themes to their own personal experiences.

Resources

- **Official website:** <https://mahara.org/>



FOCUS ON: Wooflash

A powerful tool for retrieval practice and formative assessment in higher education



What is it?

Wooflash is a learning platform designed to support knowledge retention through retrieval practice and spaced repetition principles. The platform allows teachers to create formative assessment activities, revision exercises, and self-assessment pathways based on cognitive science approaches to learning.

Wooflash can be used to support continuous learning, autonomous revision, and formative assessment in higher education. Students receive immediate feedback and can revisit concepts progressively over time, while teachers can monitor participation and learning progression.

Benefits for Virtual mobility

In virtual mobility and hybrid learning contexts, maintaining learner engagement, and supporting continuous learning can represent an important challenge. Tools based on retrieval practice and formative assessment may help students consolidate knowledge progressively and remain active throughout the learning process.

- Supports retrieval practice and **long-term knowledge retention**
- Encourages **continuous and autonomous learning**
- Facilitates **low-stakes formative assessment** in online and hybrid learning contexts

Case Study

Using Wooflash to support competency-based learning in medical education

At the University of Montpellier's Faculty of Medicine, Wooflash has been integrated into Moodle to support competency-based learning approaches and knowledge consolidation throughout the semester. The initiative was presented as part of a pedagogical feedback session exploring the role of retrieval practice within medical education.

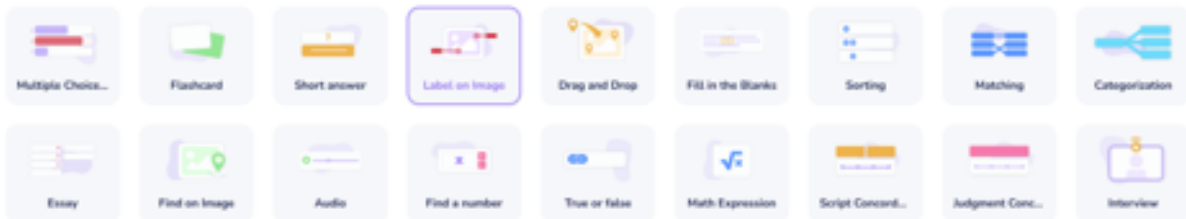
The project examined how Wooflash could support the progressive mobilisation of knowledge in connection with the 4C/ID instructional design model. Used alongside Moodle and Wooclap, the platform helps students engage in both synchronous and asynchronous learning activities while providing teachers with feedback on students' level of understanding over time.



Informative content



Questions



Wooflash can support the articulation between knowledge acquisition and knowledge mobilisation within competency-based approaches.

— Educational Engineering Team & Faculty of Medicine,
University of Montpellier

Resources

- **Official website:** <https://www.wooflash.com/>
- **Getting started:** <https://docs.wooflash.com/en/>



4. Student Engagement

Designed to enhance participation and engagement, these tools enable collaboration, audience response, skills building, gamification, and immersive field-based learning activities.

4.1 Collaboration and Brainstorming

Want to brainstorm, co-create, and visualise ideas together? These virtual whiteboards and discussion platforms turn group work into shared visual thinking.

Miro ★★

Used by: HRW, JMU, UM, TCD



A web-based collaborative whiteboard platform that enables students and teachers to develop, visualise, and share ideas on an infinite online canvas

Padlet ★★

Used by: HRW



A digital collaboration tool that acts like an interactive bulletin board, document, or web page

Civinc ★★

Used by: UU



A Netherlands-based online, anonymous chat application designed to foster inclusive debate

MS Whiteboard ★★★

Used by: TCD



A digital whiteboard that functions like a traditional whiteboard but which is hosted virtually

Etherpad ★

Used by: HRW



A free, open-source, web-based text editor for synchronous collaborative writing that highlights every writer's contribution in a specific colour



4.2 Audience Response

Looking to keep your class engaged whether they are in the room with you or participating digitally? Discover tools for interactive quizzes, live polling and instant feedback that keep attention levels high and encourage active learning.

Wooclap ★★★

Used by: HRW, UM, UU, ELTE, UB



An interactive survey, live-polling and quiz platform with AI features that transforms passive lectures into dynamic, engaging learning experiences

Mentimeter ★★

Used by: ÅAU, UiB



An interactive presentation and live polling tool

Vevox ★★★

Used by: TCD



An audience engagement tool which enhances online, hybrid, and face-to-face sessions with options for live polling, quizzes, surveys, and Q&As

4.3 Skills Development

Looking to help students build confidence and competence through skills practice? The following tools enable students to develop and refine key skills through practice and feedback:

TrainTool

Used by: UU



An online video training tool that focuses on practicing soft skills such as presentation and communication skills through AI-powered roleplays

VirtualSpeech ★★★

Used by: ÅAU



An AI-powered training tool that uses realistic simulations to help people practice and improve communication and soft skills



4.4 Gamification

Need a dynamic way to motivate and engage your learners? The following gamification tools are used in our partner universities to drive participation, track progress, and make learning more interactive and rewarding:

LevelUp! Pro

(Moodle-Plugin) ★★ ★

Used by: HRW, UM



A Moodle gamification plugin that boosts student engagement by awarding experience points (XP) and assigning levels as users progress through course activities

Stash (Moodle-Plugin) ★★ ★

Used by: UM



A digital scavenger hunt tool that turns learning into a game by letting teachers hide virtual items inside a course for students to find and reward them for exploring every part of a course. The Stash tool suite consists of the Stash block, Stash availability, and Tiny Stash

H5P (Moodle-plugin/core functionality) ★

Used by: HRW, UM



Mini-authoring tool for interactive elements of all kinds that helps teachers create rich, responsive interactive content such as quizzes, videos, branching scenarios, and games



4.5 Geo-Localised/Field Activities

Taking learning outside the classroom? Turn fieldwork and city walks into interactive, location-based experiences with these mobile apps.

Peek ★★ ★

Used by: UM



An interactive, map-based mobile tool / excursion app that guides students through real environments and prompts them to explore, reflect, and collaborate

SEPPPO ★★ ★

Used by: UU



An online tool for location-based learning and game-based learning



FOCUS ON: Miro

The perfect tool for visualizing ideas and getting creative together on a large scale



What is it?

Miro is a web-based collaborative whiteboard platform that enables students and teachers to develop, visualize, and share ideas on an infinite online canvas. Thanks to its wide range of functions, this highly versatile tool can be used for many different purposes: from introductory activities and icebreaker games at the beginning of an online lecture or event, to brainstorming sessions with digital sticky notes and dot voting, collaborative mind maps and concept maps, and even complex planning and project management tasks. Its unlimited work surface allows for maximum freedom of design, while an extensive collection of building blocks and board templates provides guidance and inspiration including, most recently, AI-accelerated templates and blueprints (preconfigured virtual work environments with ready-made workflows and boards).

Miro makes it possible to translate many classic classroom, workshop, meeting, and event activities into remote and hybrid scenarios. Concrete reasons to integrate it into the CHARM-EU toolkit:

- **Facilitates collaborative writing and drawing** like conventional online whiteboard applications but also opens up a vast range of presentation options and interactions.
- Ideal for activities aimed at **promoting the development of essential skills and competencies**, such as (digital) communication, collaboration, content creation and presentation skills.
- Everything **in one place and always available** from anywhere. Saving the results of groupwork phases requires no additional effort (no more photo minutes!) and information is always accessible to all participants.
- No account needed for students. You can **join via shared link**.
- Can be **customized** to suit different contexts, from playful to professional.
- Popular **business tool** which students are likely to encounter in their future professional lives.

Benefits for Virtual Mobility

In a virtual or hybrid mobility context, where students and teachers connect simultaneously from multiple countries and time zones, Miro creates a shared interactive space that reinforces co-presence and belonging:

- Content presentation can easily be combined with engaging individual and group tasks within the same virtual environment.
- Synchronous live activities during online classes encourage students to participate actively rather than passively consume information.
- Participants can see their own and others' cursors on the board and



- follow in real time what is currently being worked on.
- Teachers can provide students with boards for self-organized group work.
 - Shared boards are accessible at any time from desktops as well as mobile devices (although functionality is limited on mobile phones).

Case Study:

Getting ready to learn more about intercultural management with a Miro icebreaker activity

Prof. Dr. Julia Thalmann, Professor of Retail and E-Commerce at HRW, is one of many lecturers who open their online classes to students from all CHARM-EU universities as part of CHARM-EU's Transnational Online Learning (TOL) programme. This gives students the opportunity to learn with peers from different countries, cultural backgrounds and disciplines.

Julia's class "**Intercultural Management**" is particularly well suited to TOL, as the module focuses on **intercultural communication and negotiation**. Students explore how cultural values, norms and expectations shape communication, relationship-building and negotiation – while experiencing these differences directly within an international group.

To introduce these topics and build a sense of community from the outset, Julia designed a short Miro icebreaker activity at the start of the semester:

First, **students illustrated stereotypical assumptions** about their home countries **using memes**, which they pinned to a shared board. They then briefly explained their cultural significance and reflected on whether the stereotypes matched their own experiences, supported by guiding questions prepared in Miro.

The activity introduced a central theme of the module: our cultural perspectives influence how we interpret communication and behaviour. Discussing these assumptions within an international group highlighted how differently the same behaviours can be perceived – an important insight for intercultural communication and negotiation.

In the second part, students shared **examples of traditional foods and the customs or rituals** associated with them. They posted images of typical national dishes and reflected on questions such as: "**What does this ritual or food signify in that culture?**" and "**How does it bring people together?**"

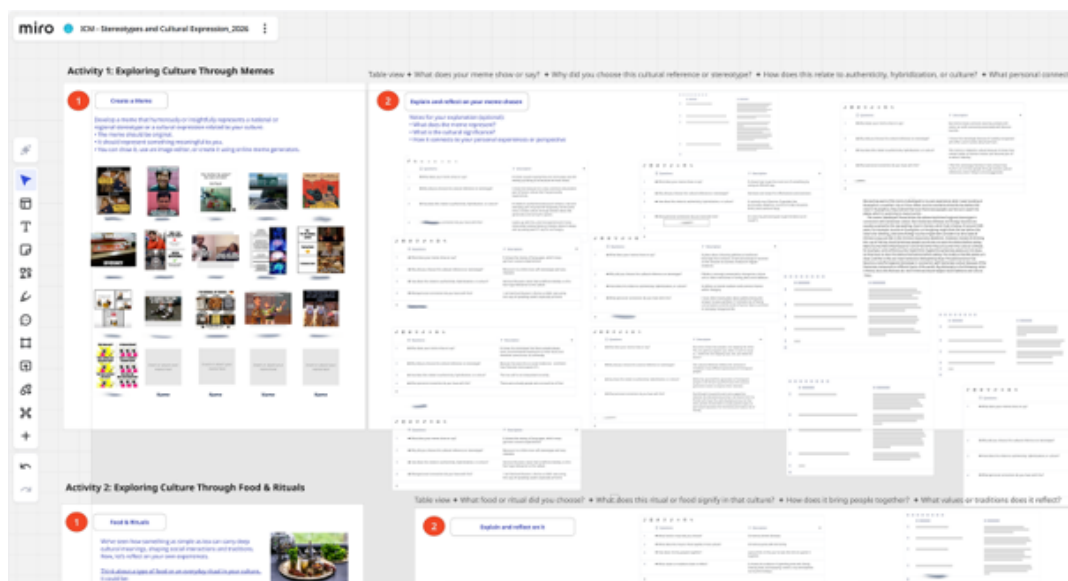
Food and rituals provide an accessible way to explore cultural norms, relationship-building and communication practices. They are also relevant to international negotiations, where hospitality, informal exchanges and social rituals can influence trust and relationships. The activity therefore created a direct bridge from everyday cultural experiences to the module's later focus on intercultural negotiation.

Students responded very positively to the interactive and collaborative approach, particularly appreciating the opportunity to explore intercultural concepts together with peers from different cultural backgrounds. They



particularly valued the combination of hybrid learning, intercultural perspectives and practical application. They contributed their own perspectives, reflected on cultural frameworks and later applied their learning in intercultural negotiation simulations.

In this way, the Miro icebreaker was more than an introductory activity: it laid the foundation for understanding how culture shapes communication, relationship-building and negotiation in international management.



Resources

- **Official website:** www.miro.com
- **Educational licensing:** <https://miro.com/education-whiteboard/>



FOCUS ON: Peek

A highly effective tool for guiding students through real environments and prompting them to explore, reflect, and collaborate



What is it?

PeekApp is a geolocated field trip platform that turns outdoor excursions into interactive, gamified learning experiences. Teachers design location-based routes and attach questions (multiple choice, open-ended, photo uploads, or timed estimation challenges) to specific points on a map. Students navigate freely at their own pace using their smartphones, engaging with course content directly in the field.

PeekApp addresses a core challenge in higher education: bringing students into genuine dialogue with their physical environment, whether during a local field trip, a residential mobility week, or a place-based discovery activity at a partner university.

- **Location-triggered questions:** content is delivered exactly where it matters most, anchoring theory to real-world context
- **Free roaming format:** students explore at their own pace, individually or in small groups, reducing logistical pressure on teaching staff
- **Scalable for large cohorts:** the app guides students independently in the field, freeing teachers to focus on high-value interactions

Benefits for Virtual Mobility

For CHARM-EU students arriving at a partner university (often for the first time, in an unfamiliar city) PeekApp creates an immediate, structured connection to their new environment.

- **Welcome and orientation walks** can be designed as Peek excursions, helping incoming students discover the campus and city through academic lenses
- **Intercultural, cross-disciplinary field activities** allow students from different programmes and countries to explore shared territory together
- **Autonomous navigation** reduces language-barrier anxiety. Students follow the map and respond to content in their own time
- **Photo upload tasks** create a visual record of student observations, useful for reflection and portfolio-based assessment
- **Gamification fosters a sense of playful discovery**, particularly valuable for building cohort identity during short mobility windows
- **Teachers can co-build and share route libraries** across partner institutions, enabling reuse and collaborative content development



Case Study

Geolocated orientation excursions across the CHARM-EU Alliance

When CHARM-EU students arrive at a partner university for a mobility period, they face a double transition: a new academic environment and an unfamiliar city. Teaching teams across the alliance identified a shared need: an engaging, low-pressure way to help incoming students develop a genuine sense of place, build cohort identity, and connect their academic interests to the territory around them, from day one.

CHARM-EU has used the Peek app extensively in its MSc in Global Challenges for Sustainability, and within institutional specific contexts including:

- **MOXMO:** An [award-winning](#) sustainable tour around Balaruc-les-Bains to help students discover their surroundings and the connections with sustainability of a place new to most of them.
- **Trinity College Transdisciplinary Field Trip, Dublin, Ireland:** A tour in Trinity College Dublin where students learn about key transdisciplinary projects located on campus.
- **Collserola Natural Park, Barcelona, Spain:** Students visited Collserola Natural Park as part of the MSc in Global Challenges for Sustainability Food Module.
- **Szeged, Hungary:** Students were introduced to sustainable cereal production on a farm as part of the MSc in Global Challenges for Sustainability Food Module.
- **Utrecht, The Netherlands:** Students visited urban gardening projects as part of their MSc in Global Challenges for Sustainability.
- **Welcome to CHARM-EU:** All CHARM-EU universities have created a Peek app field trip for students starting their studies in a new location.

Resources

- **Official website:** www.peek.app
- **How it works:** www.peek.app/how-it-works
- **Pricing & free trial:** www.peek.app/prices
- **Community & examples:** www.peek.app/the-peek-community



FOCUS ON: Wooclap

wooclap

An ideal tool to transform lectures into dynamic, engaging learning experiences

What is it?

Wooclap is **an interactive questioning platform powered by AI** that transforms passive lectures into dynamic, engaging learning experiences.

Students respond to questions in real-time using their smartphones, tablets, or laptops, with no app download required. Wooclap supports over 20 question types, from traditional multiple-choice to creative word clouds, open-ended questions, and collaborative brainstorming. The AI features help instructors create questions instantly and provide automated feedback to students.

Wooclap addresses one of the core challenges of international higher education: keeping students from diverse linguistic and cultural backgrounds genuinely engaged during shared online or hybrid sessions. Concrete reasons to integrate it into the CHARM-EU toolkit:

- **AI question generation** from any uploaded document in minutes, in multiple languages.
- No account needed for students. **Join via URL or QR code** in seconds.
- Fully **GDPR-compliant**, servers hosted in Europe. Compatible with university data policies.
- Native **integrations** with Moodle, Canvas, Blackboard, MS Teams, and PowerPoint.
- **Anonymous participation** mode to reduce language-barrier anxiety for international cohorts.
- Detailed **post-session analytics** exportable to CSV for pedagogical follow-up.

Benefits for Virtual Mobility

In a virtual or hybrid mobility context, where students and teachers connect simultaneously from multiple countries and time zones, Wooclap creates a shared interactive space that reinforces co-presence and belonging:

- Synchronous live activities during joint online lectures maintain collective energy across locations.
- Asynchronous quiz mode allows students to complete activities at their own pace between sessions.
- Shared content libraries let international teaching teams co-build and reuse activity banks.
- Real-time visual analytics help facilitators instantly identify comprehension gaps within a multicultural group.
- Language-agnostic question formats (image-based, ranking, matching) reduce textual barriers.

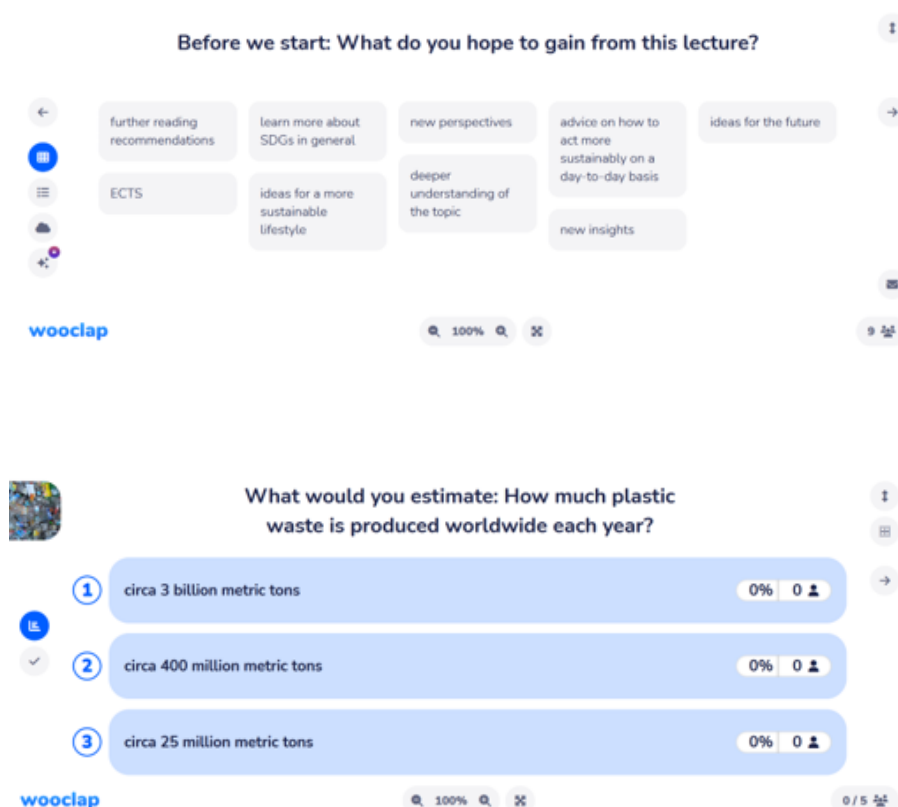


Case study

Exploring expectations and fostering active participation with Wooclap

A quite simple, effective, and therefore popular way to use Wooclap at HRW and throughout the CHARM-EU alliance is to conduct expectation surveys at the beginning of a new academic year. A short survey on students' expectations concerning the course and collaboration with the instructor helps to break the ice and can serve as the basis for developing a clear teaching and learning agreement.

Wooclap can also be used very effectively to cognitively activate students during individual class sessions. Teachers can foster student engagement and keep learners thinking by occasionally pausing during a lecture and asking them to make a prediction or vote on the possible outcome of a situation, case, or experiment. Interactive elements like these not only keep students alert by breaking the routine of the class and encouraging participation, but they also promote deeper engagement with the subject matter and may also support critical thinking.



Resources

- **Official website:** <https://www.wooclap.com>
- **Getting started:** <https://docs.wooclap.com/en/>
- **Tutorial:** <https://www.youtube.com/wooclap> (5mn video)



5. Content Creation

Ready to design your own digital learning materials? Explore tools to author courses, design visuals, edit media, and make content accessible.

5.1 Audio and Video Production

Recording a podcast, editing a lecture, or animating a tutorial? These tools cover audio editing, video production, and AI-driven media creation.

Audacity ★	Used by: TCD
 Audacity	An open-source and cross-platform tool for recording, editing, and producing audio content
Microsoft Clipchamp ★★★	Used by: ÅAU
 Clipchamp	An online video editor platform available through a Microsoft 365 account. It enables the creation and editing of videos and the generation of on-screen subtitles and transcription

5.2 Video Management

Want your lectures to live beyond the live session? These platforms record, stream, caption, and host your video content.

Esup-POD ★★	Used by: UM
	An open-source video management platform designed for higher education and research, enabling universities to publish on-demand and live videos, manage metadata, and make media available to students, teachers, researchers, and staff through an institutional video portal
Opencast ★	Used by: HRW
 OPENCAST	An open-source video management system. It allows users to schedule, record, edit, and distribute video and audio content



Panopto ★★☆☆

Used by: ÅAU, UiB, TCD, ELTE



A video platform for recording and streaming (lecture capture, videos, subtitles)

5.3 Live Translation and Captioning

Teaching to a multilingual audience? Add live captions and automatic translation directly into your sessions.

EventCat ★★☆☆

Used by: UM



A real-time captioning and translation solution; works with MS Teams and Zoom

Buzz Captions & Whisper AI ★ **Used by: ÅAU, UiB**



Buzz Captions

A tool for transcribing and creating subtitles for videos using OpenAI's automatic speech recognition system Whisper AI

5.4 Text-to-Speech and Speech Recognition

Want to make your content more accessible or transcribe a lecture automatically? These tools convert text to voice and speech to text.

ReadSpeaker ★★☆☆

Used by: UU



A cloud-based text-to-speech (TTS) accessibility tool that converts written text into lifelike spoken audio.



5.5 Graphics and Illustrations

Need eye-catching visuals to carry your message? Turn ideas into graphics, slides, and infographics with a little help from AI.

Canva ★★

Used by: TCD



A cloud-based graphic design tool that allows users to create professional-quality visual content for presentations

Genially ★★★

Used by: UB



An innovative platform that allows educators to design presentations, infographics, and interactive resources featuring a high level of animation and dynamism

5.6 Interactive Course Modules

Want to build scenario-based or interactive courses from scratch? These authoring environments let you design rich, structured learning experiences.

Articulate (Storyline & Rise)
★★★

Used by: TCD



A complete software subscription used to create online learning courses. Core tools include:

- Storyline 360 for custom interactivity
- Rise 360 for rapid responsive web courses
- Review 360 for stakeholder feedback

Nolej ★★★

Used by: UM



An AI-assisted platform designed to help teachers transform existing educational resources into interactive learning activities

H5P ★

Used by: HRW, UM



A platform for creating rich, responsive interactive content such as quizzes, videos, and games. Moodle core integration and plugin available



FOCUS ON: Audacity

The ideal tool for recording, editing, and exporting audio



What is it?

Audacity is a free, open-source, and cross-platform digital audio workstation used for recording and editing sounds on Windows, macOS, and Linux. It can be used for podcasting, music production, and voiceovers, allowing users to cut, mix, remove noise, and apply effects to multiple audio tracks.

Audacity offers several pedagogical and practical benefits for educators, including:

- **A relatively simple, user-friendly interface.** Beginners can quickly learn basic functions like recording, cutting, and trimming, moving tracks, and exporting audio.
- **Free and open source.** Students and educators can use it without licensing costs.
- **Builds digital literacy.** Teaches recording, editing, mixing, applying effects, and exporting audio.
- **Supports assessment and feedback.** Enables audio submissions and allows teachers to give personalised audio feedback.
- **Fosters creativity.** Students can experiment with sound effects and storytelling.

In the hybrid classroom Audacity bridges the gap between in-person and remote learners in a hybrid classroom by making content creation, submission, and feedback flexible, engaging, and accessible for all participants.

Benefits for Virtual Mobility

Concrete reasons for **teachers** to integrate Audacity into the CHARM-EU hybrid classroom toolkit:

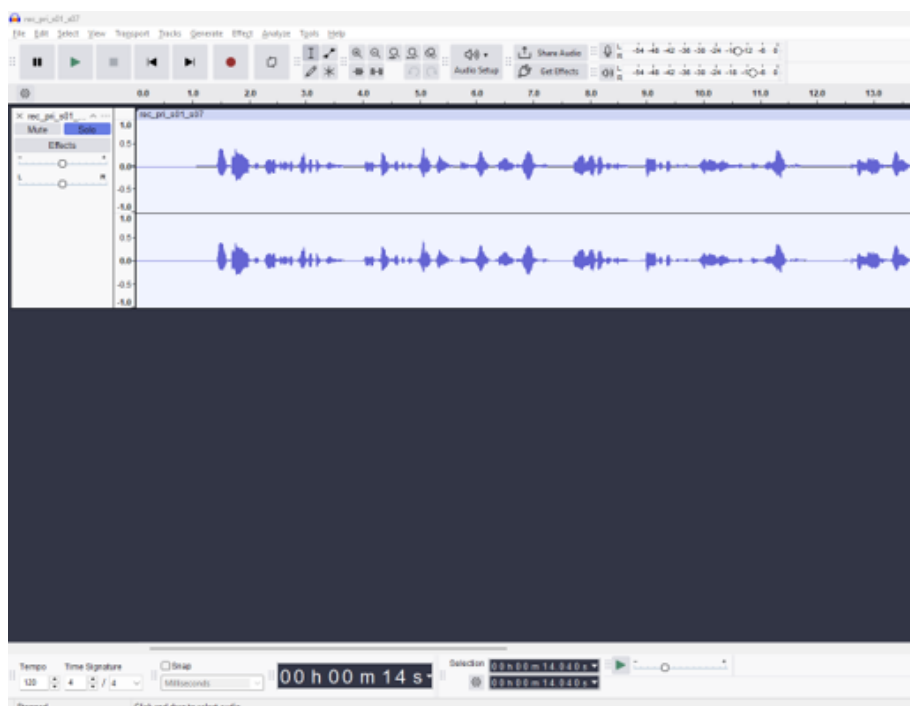
- Creating pre-recorded lectures, explanations, or demonstrations in audio format
 - Online students can listen asynchronously, while in-person students can review audio content during class or at home.
- Providing audio feedback
 - In addition to written feedback, teachers can give detailed feedback on assignments via short audio clips. Audio feedback can feel more personal and help clarify comments via vocal tone and emphasis.
- Preparing supplementary resources
 - Teachers can create short podcasts on module-related topics.
- Facilitating flipped learning
 - Students can be assigned to listen to a recorded lecture before class, freeing in-person time for discussion, group work, or hands-on



projects.

Concrete reasons for **students** to integrate Audacity into the CHARM-EU hybrid classroom toolkit:

- Recording and submitting assignments remotely
 - Students can create podcasts or oral presentations and submit audio files, regardless of their location.
- Collaborating across locations
 - Students in different locations can share audio tracks or provide peer feedback, then combine them into a joint project.
- Self-assessment and reflection
 - Students can record themselves practicing a speech or a language exercise; then listen back, and improve before submitting the final version.
- Enhancing engagement
 - Audio creation gives online students a tactile, creative task instead of just reading or typing, keeping them engaged alongside in-person peers.



Case Study 1

Using Audacity for External Guest Lectures

Industry experts are asked to contribute to online Master's programmes but these guest lecturers may be based internationally and unable to travel to the TCD campus to deliver or to record their sessions in person. They can use Audacity to record their lectures from home or their workplace. These can then be sent to TCD's audiovisual department to process by editing, removing background noise, and cutting the audio into the relevant sections.

**Benefits:**

- External experts can contribute without needing to travel to campus
- Students can access lectures at any time
- Recordings can be replayed to reinforce understanding of complex topics
- Higher education institutions can provide a richer range of expert perspectives from around the world
- No need for the professional studio

Case Study 2**Using Audacity for Lecturer Podcast Creation**

Lecturers can provide students with an additional way to engage with course content beyond readings and slides.

If topics focus on discussion, reflection, and real-time examples, visual materials may not always be necessary, and podcasts provide a suitable alternative. Audacity can be used to create a series of short podcasts discussing key concepts, current events, and revision topics. The podcasts can be uploaded to the institution's learning platform as standalone learning resources.

Benefits:

- Supports Universal Design for Learning (UDL) by offering variety in how students access and engage with content
- Creates flexible learning opportunities, allowing students to listen at a time and place that suits them
- Enables students to learn while commuting, exercising, or studying independently
- Provides a standalone resource that complements other course materials without requiring visual content
- Encourages greater engagement by making learning more accessible and convenient

Resources

- **Official website:** [Audacity](#)
- **Instructions for downloading Audacity:** [How to Download Audacity for Windows 11](#)
- **Getting started:** [Audacity Lesson 1: Record, Play, Input, Output](#)



FOCUS ON: Buzz Captions

A comprehensive tool for transcribing recordings and creating subtitles for videos



Buzz Captions

What is it?

Buzz Captions is an application that uses AI to transcribe, i.e., turning speech to text, without connecting to a cloud service. It is typically used by researchers for creating subtitles for videos or for transcribing sensitive interviews. Buzz can use most Whisper AI-based transcriptions models for quality transcriptions in over 60 languages. Because it runs locally, it runs slow, but secure; without the recording leaving your computer. A powerful computer can enable transcriptions in real time.

It allows you to turn an audio or video recording into text without connecting to the internet.

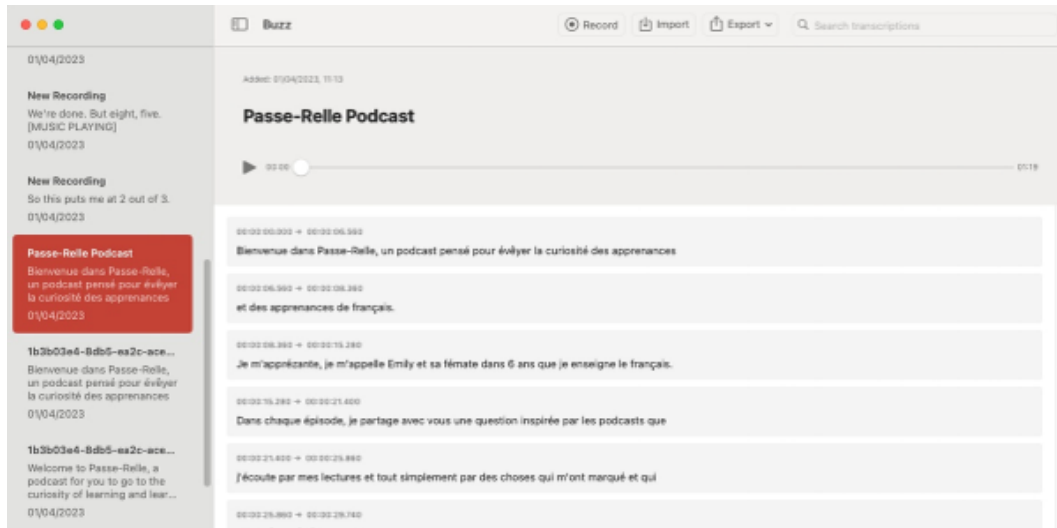
Benefits for Virtual mobility

It can create subtitles for video lessons and even translate them from another language into English, increasing accessibility for educational material with little effort. It can also process tasks overnight without user input. Buzz has a feature that creates timestamps for recordings so transcriptions can be used as video subtitles as well.

Case Study

Thematic coding for recorded interviews

Researchers wanted to run a thematic coding software (NVivo) on interviews spoken with a heavy Swedish dialect. The software could only process text and the interviews contained personal data, making file transfer cumbersome and a professional transcription service would have been expensive. Buzz helped by creating a raw transcription using an AI-model trained by The National Library of Sweden that the researcher could then proofread and analyze. This was the pilot run for Buzz Captions.



Resources

- **Official website:** <https://buzzcaptions.com>
- **Getting started:** <https://chidiwilliams.github.io/buzz/docs>
- **Tutorials:** https://chidiwilliams.github.io/buzz/docs/usage/file_import



FOCUS ON: Esup-Pod

The ideal tool for hosting, streaming, and enriching educational videos for flexible teaching and virtual mobility



What is it?

Esup-Pod is an open-source video management platform designed for higher education and research. It enables universities to publish on-demand and live videos, manage metadata, and make media available to students, teachers, researchers, and staff through an institutional video portal.

With Pod, educators can upload a lecture recording, encode it automatically for web playback, add subtitles and chapters, attach documents, organize videos in channels and playlists, and share them in a course or learning activity. For students, it creates a central place to watch course content before, during or after a virtual mobility experience.

Benefits for Virtual mobility

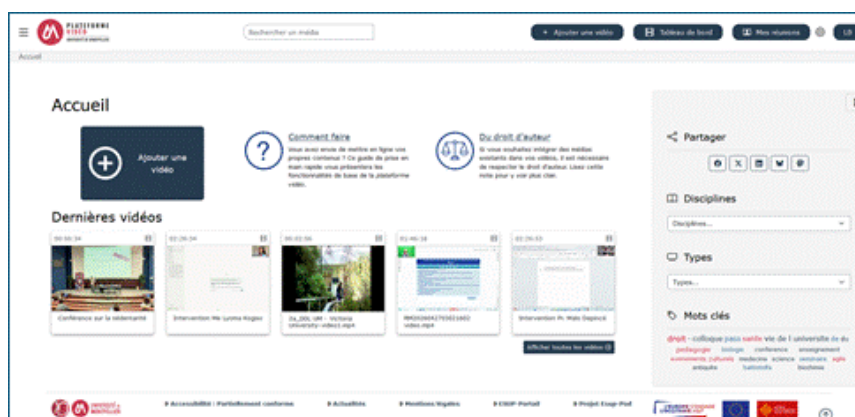
For virtual mobility, Esup-Pod supports asynchronous access to teaching material and helps make international learning activities more inclusive, reusable, and easier to manage.

- **Flexible access to learning content:** students in different time zones can view course videos, tutorials, seminars and replays at their own pace.
- **More inclusive and structured learning:** subtitles, chapters, indexing, and additional documents help students navigate content and support multilingual or accessibility needs.
- **Reduced workload and better reuse:** teachers can record once, enrich the video, reuse it across course editions, and share it via Moodle or links instead of repeatedly running synchronous sessions.

Case Study

Using Esup-Pod to support blended and virtual mobility activities at Université de Montpellier

Université de Montpellier uses an Esup-Pod instance as its institutional video platform (video.umontpellier.fr). In a virtual mobility or blended course, teachers can publish recorded lectures, presentations, lab demonstrations or event replays in Pod, enrich them with subtitles, chapters, or documents, and share them with international students before and after live sessions. This helps students prepare asynchronously, revisit complex content and maintain access to teaching materials throughout the mobility period.



Resources

- **Official website:** <https://pod.esup-portail.org/>
- **Getting started:** <https://github.com/EsupPortail/Esup-Pod>
- **Technical documentation:** <https://esupportail.github.io/Esup-Pod/>
- **Tutorials:** <https://moodle.esup-portail.org/course/index.php?categoryid=2>



FOCUS ON: Nolej

A comprehensive tool for creating content with a little help from AI



What is it?

Nolej is an AI-assisted platform designed to help teachers transform existing educational resources into interactive learning activities. From documents, videos, presentations, or web content, the platform can automatically generate quizzes, flashcards, glossaries, and other pedagogical activities.

In higher education, Nolej can support the rapid creation of learning materials and formative assessment activities while helping teachers diversify pedagogical formats. The platform is particularly relevant in hybrid and online learning environments where interactive resources may support learner engagement and autonomous learning.

Benefits for Virtual mobility

In virtual mobility and online learning contexts, creating engaging and accessible learning activities can require significant preparation time. AI-assisted content generation tools may help teachers develop interactive learning resources more efficiently.

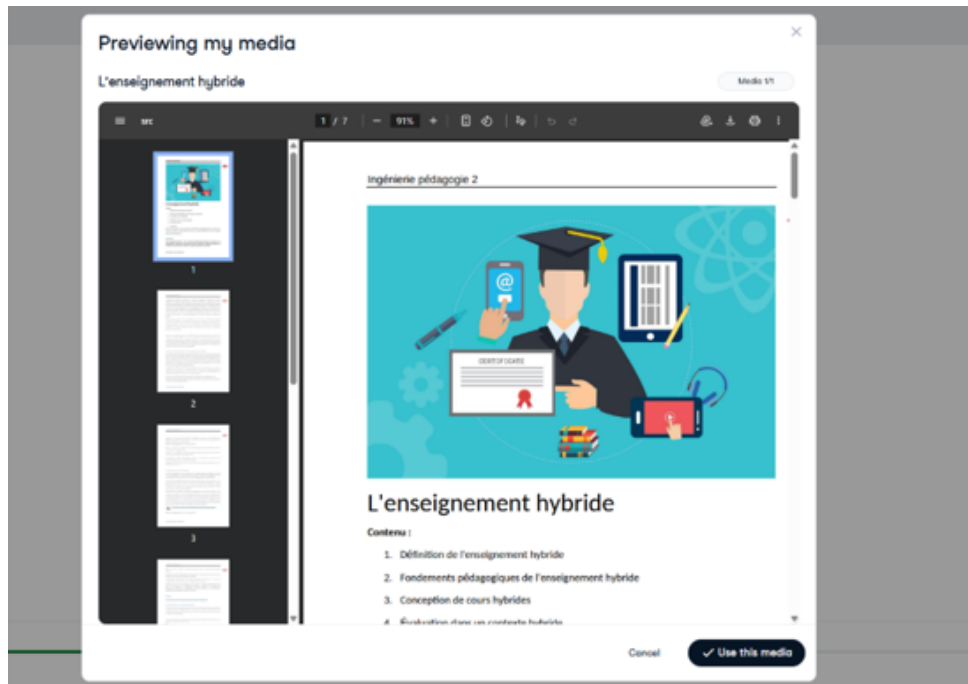
- Supports the creation of interactive learning activities
- Facilitates diversification of pedagogical resources
- Helps reduce the time required to create formative activities

Case Study

Exploring AI-assisted activity generation with Nolej

At the University of Montpellier, Nolej is currently being explored as part of an experimental phase focused on AI-supported pedagogical practices and digital learning environments. Integrated into the Moodle activity chooser, the platform is being tested to examine how AI-assisted generation of quizzes and learning activities could support teachers in creating interactive educational resources from existing course materials.

This experimentation particularly focuses on the potential contribution of AI tools for formative assessment, learner engagement, and the diversification of pedagogical activities within higher education contexts.



Instructors can preview their uploaded teaching materials before using them to generate interactive learning activities

Choose your options

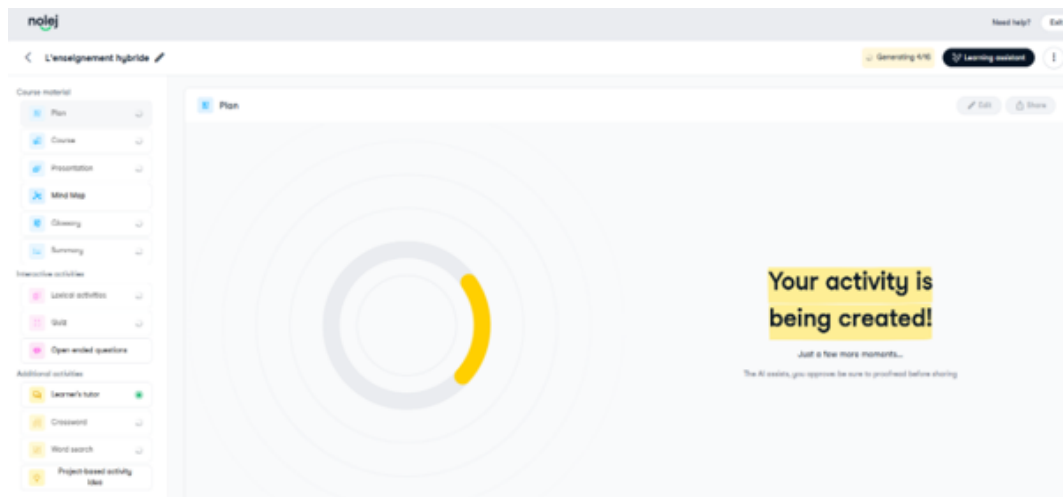
What is the title of your course?*

What is the language of your module?*

ADDITIONAL OPTIONS

These options allow you to refine the activities to suit your needs.

Instructors can tailor the generated activities by defining educational objectives, keywords and difficulty level, while also using inclusion tools to better address learners' needs.



From a single source document, Nolej generates a variety of course materials and interactive activities. The left-hand panel displays the different outputs available, including a plan, course content, presentation, mind map, glossary, summary, quizzes, open-ended questions, lexical activities, and additional learning supports.

The AI tutor provided interesting support for designing learning activities and exploring new ways of integrating generative AI into teaching practices.

— Faculty member, Faculty of Education, University of Montpellier

Resources

- **Official website:** <https://www.nolej.io/>



6. Generative AI Tools and Platforms

Curious about putting AI to work for teaching, tutoring, or student support? Discover the AI assistants and chatbots already in use across CHARM-EU partners.

Microsoft Copilot ★★ ★

Used by: ÅAU, JMU, TCD, UiB, UM, ELTE, UB



Microsoft Copilot is an AI-powered assistant built on large language models that helps users write, code, and analyze data using everyday language. It is deeply embedded across the Microsoft 365 ecosystem, Windows, and Edge browser to work directly inside Microsoft's most popular apps

One Tutor ★★ ★

Used by: JMU



An AI-powered learning assistant that allows students to ask questions about lecture material and receive answers based on the lecturer's own notes. It includes lecturer-created quizzes and provides anonymous insights into student questions, helping lecturers understand which topics need more attention

GenKI (Ki:connect.nrw) ★★ ★

Used by: HRW



A platform (Ki:connect.nrw) funded by the Ministry of Culture and Science of the State of North Rhine-Westphalia, Germany, through which all higher education institutions in North Rhine-Westphalia can gain centralised access to commercial generative AI – offered to staff and students at HRW under the name GenKI

Wikit ★★ ★

Used by: UM



A generative AI chatbot and assistant platform

**UiBchat ★★ ★****Used by: UiB**

A generative AI chatbot that is made available to UiB's students and employees

Learnwise ★★ ★**Used by: UU**

An AI-driven platform providing personalised, course-specific help by answering academic, technical, and administrative questions through an AI assistant

Whisper AI ★★ ★**Used by: ÅAU, HRW**

Automatic speech recognition (ASR) system for advanced speech-to-text tasks

VirtualSpeech ★★ ★**Used by: ÅAU**

An AI-powered training tool that uses realistic simulations to help people practice and improve communication and soft skills

Traintool**Used by: UU**

An online video training tool that focuses on practicing soft skills such as presentation and communication skills through AI-powered roleplays



7. Knowledge and Data Management

Looking for tools to organize knowledge, manage information, or analyze data? Browse applications that support note taking, knowledge mapping, and research analysis.

7.1 Knowledge Management and Notetaking

Want to help your students structure their thinking and organize what they learn? Explore tools for notetaking, personal knowledge graphs, and argument mapping.

Rationale Online ★★ ★

Used by: UU



A tool to build critical thinking and reasoning skills through argument mapping. By making argument maps, students display and scaffold the thinking process. Argument maps allow teachers to monitor and assess students' thinking processes

Goodnotes ★★ ★

Used by: HRW



A digital notetaking and document markup application that allows students and teachers to capture ideas and organize notes

Notability ★★ ★

Used by: HRW



A digital notetaking application that lets you write by hand, record audio, and mark-up PDFs



7.2 Reading Lists and Reference Management

Curating the bibliography of your course? These tools help you build, share, and manage reading lists and bibliographic resources.

Citavi ★★★

Used by: HRW



A reference management and knowledge organization software used primarily in academic research to collect sources, manage quotes, plan tasks, and generate bibliographies

Leganto ★★★

Used by: UiB



A digital reading list management system used to connect course materials, library books, and online articles directly to learning management systems like Moodle

Sylla ★★

Used by: UU



An AI-supported tool to discover open educational resources (OER) to replace commercial e-textbooks

Zotero ★

Used by: UM, ELTE, UB



A free, open-source reference management software

EndNote ★★★

Used by: ELTE, TCD



A reference management software that helps students, researchers, and writers collect, organize, and cite research sources

Mendeley

Used by: ELTE



A reference management software that helps students, researchers, and writers collect, organize, and cite research sources



7.3 Data management, analysis, and simulation

Need discipline-specific software for research and data analysis? Find statistics, qualitative analysis, GIS, and digital humanities tools tailored to advanced academic work.

NVivo ★★



Used by: ÅAU, UiB, TCD

Software for qualitative data analysis

SPSS ★★★



Used by: ÅAU; HRW, UiB, TCD, ELTE, UB

Statistical Product and Social Sciences (SPSS), a software program used by researchers for quantitative analysis of complex data

Stata ★★★



Used by: UiB

A statistical software package for data manipulation, visualisation, statistics, and automated reporting

ArcGIS ★★★



Used by: ÅAU, UiB, UU, ELTE, UB

Geographic information system

Grasple ★★



Used by: UU

A practice and assessment platform with open exercises for mathematics and statistics

Inspira Originality ★★★



Used by: UB

An academic integrity, plagiarism and AI detection tool integrated into Inspira Assessment and major learning management systems (LMS)



MATLAB

Used by: ELTE, HRW



A computing platform used for engineering and scientific applications like data analysis, signal and image processing, control systems, wireless communications, and robotics. Includes a programming language, interactive apps, highly specialized libraries for engineering applications, and tools for automatically generating embedded code



FOCUS ON: Goodnotes

An effective tool for notetaking, annotations and keeping your ideas organized



What is it?

Goodnotes is a digital notetaking and PDF mark-up app that combines the natural feel of handwriting with the flexibility of a digital workspace. It is especially useful on a tablet with a stylus, but can also be used across other devices including desktop PCs to:

- Take handwritten or typed notes
- Annotate PDFs
- Organize digital planners
- Keep learning, research, project, or supervision journals
- Create portfolios
- Collect ideas on open-end virtual whiteboards.

The app offers extensive customisation options: virtual notebooks, the writing environment itself and the writing tools can all be finely adjusted to meet individual needs, working styles and aesthetic preferences. Handwritten notes can be converted into typed text and made fully searchable, helping students and teachers retrieve thoughts and passages, key terms, comments, and references at a later stage. The newly added AI assistant feature “Ask Goodnotes” can also summarize notes, answer questions about the content of writers’ notebooks and spellcheck handwriting. For students and teachers working with multiple sources at the same time, Goodnotes offers a particularly useful tab function that enables quick movement between different documents.

Benefits for virtual mobility

Goodnotes replaces physical notebooks, printouts and loose-leaf folders with portable digital versions that keep materials organized, readily available and support a more sustainable, paperless way of working. Text work in a Goodnotes notebook is usually carried out locally on the user’s own device, but if cross-device syncing via cloud is activated, personal notebooks remain accessible even when the preferred device is not immediately at hand. So, a student can for example prepare notes on a tablet, review them later on a laptop, and access important documents while travelling or studying remotely.

Case Study

Intensifying text work through notetaking and annotations

The ability to read, analyze and critically reflect on texts in depth remains a fundamental academic skill even in the age of generative AI, or especially



now. For a deeper understanding of a text, it is essential to engage with it intensively and actively. Ideally, students will already have learnt at school not merely to skim texts and search quickly for information, but also to make that information easy to retrieve later through highlighting, marking and/or excerpts; to identify key arguments and concepts; and to integrate these into their own mental frameworks through annotations on the source material, questions about it and comparisons with other texts they already know.

In Goodnotes, all these steps can be carried out in one place: the software serves as a reader for PDFs, presenting them in a format that is easy to read and allowing them to be highlighted and annotated according to an individual system. At the same time, personal reading journals or notebooks provide space to put what has been read into one's own words, comment on it and organize it in a form that is easy to remember. The tool allows reading material and the associated personal notes to be opened side by side in different tabs and stored together in thematic folders and libraries, so that everything that belongs together is readily to hand.

The left screenshot shows a PDF document titled "Macquarie 2021: Diversification for Climate Resilience". The text is annotated with highlights in orange and green. Key sections include "DEFINITION", "GENERAL RESILIENCE", "SPECIFIC RESILIENCE", and "CLIMATE RESILIENCE". The right screenshot shows a handwritten note on a yellow background, summarizing the concepts of General Resilience, Specific Resilience, and Climate Resilience. The note includes a flowchart showing the relationship between these concepts: "GENERAL RESILIENCE" leads to "SPECIFIC RESILIENCE", which leads to "CLIMATE RESILIENCE". The flowchart also includes "unknown shock" and "adapt & transform" as inputs to "GENERAL RESILIENCE". The flowchart also includes "anticipate", "prepare for", "resist", "recover from", and "reorganize after disturbances" as inputs to "CLIMATE RESILIENCE". The flowchart also includes "change" as an input to "CLIMATE RESILIENCE", which is further broken down into "personal level" and "large-scale political levels".

Resources

- Official website: <https://www.goodnotes.com/>



Closing statement

We wish you every success in your teaching and hope this catalogue supports you in exploring the many opportunities that digital technologies bring to education.